

IN THE CLAIMS

The following listing of claims is presented for the Examiner's convenience. No amendments to the claims are being presented.

1. (Previously Presented) An immunogenic formulation comprising a bacteriophage particle the surface of which is unmodified and a pharmaceutically acceptable carrier therefor, the bacteriophage particle comprising a eukaryotic promoter and an exogenous nucleic acid molecule under control of the eukaryotic promoter and encoding a hepatitis virus polypeptide which is capable of expression and presentation on the surface of an antigen presenting cell of an organism, such that an immune response to said polypeptide is raised in the organism, wherein the immunogenic formulation is used to raise an immune response to hepatitis types A and B.

2. (Canceled).

3. (Previously Presented) The immunogenic formulation according to Claim 1, wherein the antigen expressed and presented on the surface of the antigen presenting cell is a hepatitis surface antigen.

4. (Previously Presented) The immunogenic formulation according to Claim 1, wherein the bacteriophage has been engineered to express more than one hepatitis antigen.

5. (Previously Presented) The immunogenic formulation according to Claim 1, wherein the formulation comprises greater than 10^9 bacteriophage particles.

6. (Previously Presented) The immunogenic formulation according to Claim 1, which is capable of eliciting a humoral and/or cellular immune response.

7-8. (Canceled).

9. (Previously Presented) The immunogenic formulation according to Claim 1, wherein the bacteriophage comprises transcriptional and/or translational regulators to facilitate expression of the polypeptide in addition to the eukaryotic promoter.

10. (Previously Presented) The immunogenic formulation according to Claim 1, wherein the eukaryotic promoter is selected from the group consisting of a CMV, SV40, thymidine kinase and RSV promoter.

11. (Previously Presented) The immunogenic formulation according to Claim 1, wherein the exogenous nucleic acid is under the control of a constitutive promoter and a controllable promoter.

12. (Previously Presented) The immunogenic formulation according to Claim 1, wherein the bacteriophage is lambda (λ), p1 phage, T phage, Mu, fd, M13 or a filamentous phage.

13. (Previously Presented) The immunogenic formulation according to Claim 1, wherein the bacteriophage is capable of expressing single or multiple copies of a polypeptide or a plurality of polypeptides.

14. (Previously Presented) The immunogenic formulation according to Claim 1, wherein the bacteriophage is abortive to lytic growth in the natural bacterial flora of the chosen mammalian host.

15. (Previously Presented) The immunogenic formulation according to Claim 1, further comprising inhibitors of lysosomal/endosomal enzymic catabolism and/or nuclear localisation signals.

16. (Previously Presented) The immunogenic formulation according to Claim 1, further comprising an amount of the polypeptide to be expressed by the bacteriophage.

17. (Canceled).

18. (Previously Presented) The immunogenic formulation according to Claim 1, wherein the exogenous nucleic acid also encodes a polypeptide capable of augmenting the immune response.

19. (Previously Presented) The immunogenic formulation according to Claim 1, further comprising an adjuvant.

20. (Previously Presented) The immunogenic formulation according to Claim 1, wherein the bacteriophage is associated with a vehicle.

21. (Previously Presented) A method of raising an immune response comprising administering to a human or animal an effective amount of the formulation of Claim 1.

22. (Canceled).